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ABSTRACT

Little research on the relationship between self knowledge and teacher effectiveness seems to exist. The Self Knowledge Project, a study of more than 1,000 people of various ages, identified 4 distinct stages of self knowledge development: (1) elemental; (2) situational; (3) pattern; and (4) process. The Self Knowledge Project created the Experience Recall Test, which was designed to identify a person's stage of self knowledge. To investigate the relationship between self knowledge stage and teaching effectiveness, 64 student teachers at New Mexico State University and its branch campuses took the Experience Recall Test. Results of this test were compared with the student teachers' evaluations by their college supervisors. It was hypothesized that, if a correlation could be demonstrated between stage of self knowledge and teaching effectiveness, it would be appropriate to utilize this knowledge when planning activities for the preparation of teachers. It is stated that, because of study sample size and other problematic areas, study results appear inconclusive. However, seven conclusions are offered and problems with the self knowledge measure, identification of exceptional teachers, and self knowledge and process education are discussed. (JMK)

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SELF KNOWLEDGE AND STUDENT TEACHER EFFECTIVENESS

A Paper For The Presentation:

FOCUS ON THE TEACHER: SELF KNOWLEDGE
AND PERSONAL GROWTH FOR TEACHING EFFECTIVENESS
February 18, 1980

ASSOCIATION OF TEACHER EDUCATORS

60th Annual Convention

Washington, D.C.

by

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SELF KNOWLEDGE AND STUDENT TEACHER EFFECTIVENESS

NOTE: The following paper discusses the authors' efforts to investigate the role of self knowledge in teaching effectiveness. The study is limited by the absence of conclusive definitions and measures for teaching effectiveness, as well as by the difficulty of eliciting and quantifying self knowledge. Nevertheless, the authors report their initial efforts in the complex process of solidifying with objective research that which has remained in the realm of intuitive knowledge about good teaching.

INTRODUCTION

What governs teacher behavior with students in the classroom? Teacher education programs are based in the belief that the acquisition of "professional and practical knowledge" is a determinant of productive teacher behavior. Knowledge of child development, curriculum content, and instructional methodologies, along with the less clearly defined knowledge that comes from practical classroom experience during internships and student teaching, form the basic components of nearly all preservice and inservice teacher education programs (Mancus, 1977). Phenomenological psychologies may give information concerning another crucial, though virtually unaddressed element controlling teacher behavior. This study seeks to investigate the role of personal or self knowledge, the forgotten element, in teaching effectiveness.

The kinds of decisions and responses teachers make may be dependent to a significant degree on very personal material, including:

1. the background of childhood experiences which influence the teacher's attitudes, values, and beliefs about the nature of self and the nature of the world; and
2. the teacher's level of self knowledge, i.e., knowledge of these experiential forces as significant though not necessarily dominant determinants of her/his behavior.

"Projection," a hypothetical construct from Gestalt Therapy, may illustrate these points. Teachers who believe that the world is hostile and that people are not trustworthy because their early childhood experiences have somehow conditioned this view of the world, may reflect this belief in their classroom actions; i.e., teachers may "project" onto their students and the school environment the hostile dimensions that they experienced in childhood. According to another Gestalt construct, "interjection," teachers may behave as the significant others in their past have behaved when they are in stressful situations. Some teachers may be expected to reproduce authoritarian and arbitrary ways of dealing with others if they, as children, were treated in this manner, regardless of what is taught in traditional teacher education classes. Insight psychologies give hope that the tyranny of illogical, inappropriate, and sometimes destructive responses to students may be broken through increased self knowledge for teachers.

LITERATURE REVIEW OF RESEARCH ON SELF KNOWLEDGE AND TEACHER EFFECTIVENESS

Little research on the relationship between self knowledge and teacher effectiveness seems to exist. A search of the literature has not identified any teacher education program where knowledge of self is a significant component. As a matter of fact, self knowledge does not appear to be addressed in a systematic manner at all. Leaders such as Combs, Carkhuff, Aspy, Roebuck, and Gordon have indicated through their writing and research that personal qualities are immensely important in teaching effectiveness. Combs (1969) has demonstrated a positive relationship between sense of adequate self and teacher effectiveness. Teacher Effectiveness Training (Gordon, 1974) relies to some degree on insightful understanding of such questions as, "Who really has the problem in a classroom conflict, the teacher or the student?" Carkhuff's

model for facilitating "Teacher as Person" increases insight and personal knowledge to some degree, although it is predominantly dependent upon the learning of behaviorally defined responses (protocols) to be used in problem solving (Carkhuff, 1977). The monumental study of Aspy and Roebuck (1977) concluded simply and profoundly that children do not learn from teachers they do not like. How do we help teachers become more likeable to students?

Research connecting what one knows about oneself in relationship with others (self knowledge) to teaching effectiveness is difficult because: (1) until recently self knowledge had no clear and quantifiable definition, and (2) although teaching effectiveness is heavily researched, teacher educators have no agreed upon repertoire of teaching skills which ensures success in terms of student growth.

THE MEASURE OF SELF KNOWLEDGE

The Self Knowledge Project, funded by the U.S. Office of Drug Education at the University of Massachusetts, in a study with more than 1,000 people of various ages, has identified four distinct stages of self knowledge development: (1) elemental, (2) situational, (3) pattern, and (4) process (Tamashiro, 1977).

At <u>elemental stage</u> of self knowledge, an individual fails to report a past experience as a gestalt. Rather, she/he reports discrete statements of observable behavior or environmental description that may be unrelated. Feelings are not reported.

An individual in <u>situational stage</u> of self knowledge reports memories from the past as having occurred because of the specific situations in which they occurred. The environment is responsible for causing the individual's actions. When feelings are reported, they are simple, externally observable ones, such as "happy or sad," often a reflection of the environment.

Individuals at <u>pattern stage</u> are able to identify their own recurring,

"patterned responses." The behavior exhibited repeatedly by someone who always withdraws and sits nervously alone at any public or social function for fear that assertiveness in meeting new people will result in rejection may be an example of a pattern learned in childhood or adolescence, which may no longer serve productively the needs of the individual. The expression of feeling is more profound and personally determined than at previous stages (frustration, anxiety, etc.).

Individuals at process stage are not only cognizant of recurring, habitual responses, they are able to take action to eliminate patterned behavior and react spontaneously and rationally to each new situation.

The Self Knowledge Project at the University of Massachusetts created the Experience Recall Test, designed to identify the client's stage of self knowledge (Alschuler, Weinstein, Evans and Tomashiro, 1977). The test administrator seeks to build an atmosphere of relaxation and reflection and invites the client to recall a series of childhood memories. Next, the client is invited to record one memory of her/his choice either on tape or in writing. The client is asked to answer a series of questions regarding the memory, such as "How does this experience/memory affect the person you are today?" Each sentence of the client's response is coded by trained coders as elemental, situational, pattern, or process. The level of self knowledge stage development is determined by the most advanced level of coded protocols, i.e., process stage responses, even a few, indicate the individual's ability to view her/himself and the world from that level of consciousness. Although individuals may not always function in the highest stage of which they are capable, the ability to do so implies stage development.

The hypothesis of this study is that teachers at process stage of self knowledge should be more able to resist projective or introjective responses which often result in illogical treatment of students. Teachers at pattern stage should be able to identify inappropriate behavior that may emerge from past experiences and perceptions. Teachers at situational

stage, on the other hand, would characterize all their behavior as caused by the present situation, the students, school administrators, etc. They may be unable to identify how and when their personal psychological histories interfere with fresh, rational, and appropriate responses. Without this insight, teachers and students may actually become victims of the teacher's past.

In an effort to investigate the relationship between self knowledge stage and teaching effectiveness, 85 student teachers at New Mexico State University and its branch campuses took the Experience Recall Test. Their responses were then coded by trained coders at the University of Massachusetts and stage of self knowledge was determined for each participant.

IDENTIFYING STUDENT TEACHING EFFECTIVENESS

Teacher, or student teacher, effectiveness is evaluated through many considerations. Although means of evaluation range from highly subjective to somewhat objective, nearly all means rely on expert observation (Soar, 1972; Flanders, 1970). Seven college supervisors at New Mexico State University and its two branch campuses, after five supervisory visits which spanned a semester of student teaching, were asked to rate their supervisees comparatively in five areas of teaching effectiveness:

(1) knowledge of content material taught; construction and use of instructional media, etc.

(2) planning and dependability; record keeping, punctuality, housekeeping chores, etc.

(3) addressing student interest; needs, readiness levels and learning styles in planning and teaching. . .

(4) communication with others; including students, peers, cooperating teachers, supervisors. . .

(5) classroom management skills; motivation, maintaining student involvement, dealing constructively with conflict situations, etc.

These five general areas were identified from teacher evaluation instruments used by various college supervisors at New Mexico State University. A category scale which included eight steps from "poor" to "excellent" was completed for each student teacher in each area.

It was hypothesized that if a correlation could be demonstrated between stage of self knowledge, as measured by the Experience Recall Test, and teaching effectiveness, as observed and reported by college supervisors, it would be appropriate to utilize this knowledge when planning activities in the preparation of teachers. A positive correlation was hypothesized particularly between self knowledge stage and the areas of social interaction (items three, four, and five on the effectiveness rating scale). If students who were ranked in pattern or process stage of self knowledge showed significant differences from those in the elemental or situational stages on effectiveness evaluations, then it would appear that self knowledge should be an important component of teacher preparation.

REPORT AND ANALYSIS OF THE DATA

In Spring 1978, student teachers at New Mexico State University were evaluated by their supervisors in the five identified areas. They were evaluated on a scale ranging from one to eight. An opportunity was provided for the student teachers to participate in the Experience Recall Test. Sixty-four student evaluations and Recall Tests were usable. The Experience Recall Tests were then sent to the University of Massachusetts to be coded by trained coders. The results were returned to New Mexico State University and the data were then processed through the computer. Pearson's correlation and Chi-square tests were used to determine relationships between self knowledge stage identification and effectiveness ratings.

General Background Data From The Respondents

Number and percent of the respondents by sex are shown in Table 1.

TABLE 1

NUMBER AND PERCENT OF RESPONDENTS BY SEX

Sex	N	%
Female	42	65.6
Male	22	34.4
Total	64	100.0

There were nearly twice as many females as males participating in the the study.

Number and percent of the respondents by ethnicity are reported in Table 2.

TABLE 2

NUMBER AND PERCENT OF RESPONDENTS BY ETHNICITY

Ethnicity	N	%
White	36	56.3
Hispanic	17	26.6
Black	5	7.8
No response	6	9.3
Total	64	100.0

Fifty-six percent of the student teachers were white. Nearly 27 percent were Hispanic.

The mean age of the student teachers was found to be 24 years. The median age was 22 years. Data relative to respondent age are found in Table 3.

TABLE 3

NUMBER AND PERCENT OF STUDENT TEACHERS BY AGE*

Age	N	%
21-23	41	64.1
24-26	6	9.3
27-29	4	6.2
30-32	4	6.2
33-35	2	3.2
36-38	0	0.0
39-41	4	6.2
42-44	0	0.0
45-47	1	1.6
No response	2	3.2
Total	64	100.0

*Age of student teachers, M =24
Md=22

The largest number of student teachers was found in the 21 to 23 age bracket, which shows 41, or 64.1 percent. Fifty percent of the students were below age 22.

Number and percent of the respondents by final grade in student teaching are shown in Table 4.

TABLE 4

NUMBER AND PERCENT OF STUDENT TEACHERS BY FINAL STUDENT TEACHING GRADE

Final Grade	N	%
A+	5	7.8
A	45	70.3
A-	8	12.5
B+	4	6.2
B	1	1.6
B-	0	0.0
C+	0	0.0
C	1	1.6
Total	64	100.0

Ninety-one percent of the student teachers received a final grade in student teaching of "A." Nearly 98 percent of the students were evaluated "B+" or higher by the supervisors.

Descriptive Data Concerning Student Teacher Effectiveness and Self Knowledge

Supervisors were requested to rate each respondent in terms of effectiveness in five identified areas. Data indicating their responses are shown in Table 5.

TABLE 5

SUPERVISOR RATINGS OF STUDENT TEACHERS REGARDING EFFECTIVENESS IN FIVE SELECTED AREAS*

Areas	Poor (1)		(2)		(3)		(4)		(5)		(6)		(7)		Excellent (8	
	N	%	N	%	N	%	N	%	N	%	N	%	N	%	N	%
1. Knowledge of Material M = 6.55 Md= 6.60	0	00.0	0	00.0	0	00.0	2	3.1	10	15.6	18	28.1	19	29.7	15	23.4
2. Planning Dependability M = 6.55 Md= 6.67	0	00.0	0	00.0	0	00.0	4	6.3	6	9.4	18	28.1	23	35.9	13	20.3
3. Addresses Student Interests M = 6.45 Md= 6.55	0	00.0	0	00.0	0	00.0	3	4.7	11	17.2	17	26.6	20	31.3	13	20.3
4. Communication With Others M = 6.63 Md= 6.87	0	00.0	0	00.0	0	00.0	5	7.8	7	10.9	10	15.6	27	42.2	15	23.4
5. Classroom Management Skills M = 6.41 Md= 6.41	0	00.0	0	00.0	1	1.6	1	1.6	11	17.2	21	32.8	18	28.1	12	18.8

*N=64

Although the supervisors were asked to rate the student teachers comparatively on a scale from one (poor) to eight (excellent), Table 5 shows that on four of the questions no one was rated below four, and the mean and median were six or above. Only on Item 5 was anyone rated below four.

Student teachers were classified by stage of self knowledge based upon their coded responses on the Experience Recall Test. Number and percent of responses by self knowledge stage are included in Table 6.

TABLE 6

NUMBER AND PERCENT OF STUDENT TEACHERS BY SELF KNOWLEDGE STAGE

Stage	N	%
Elemental	0	0.0
Situational	15	23.4
Pattern	33	51.6
Process	16	25.0
Total	64	100.0

Nearly 52 percent of the respondents were in the pattern stage of self knowledge development. No one was in the elemental stage.

Self knowledge stage development of student teachers was further broken down by sex. The number and percent of respondents by category are reported in Table 7.

TABLE 7

STAGE OF SELF KNOWLEDGE DEVELOPMENT OF STUDENT TEACHERS BY SEX*

Stage	Female		Male	
	N	%	N	%
Elemental	0	0.0	0	0.0
Situational	5	11.9	10	45.5
Pattern	23	54.8	10	45.5
Process	14	33.3	2	9.0
Total	42	100.0	22	100.0

*Female, N=42
Male, N=22

Thirty-three percent of the female respondents were categorized in the process stage of development. Nine percent of the male respondents were at the most advanced stage of self knowledge.

Because the study encompassed an N of 64, and because of certain problematic areas which will be discussed later in the paper, the results of this study appear to be inconclusive. However, certain data are offered here for consideration:

1. The hypothesized correlation between stage of self knowledge and teaching effectiveness in interpersonal skills (items three, four and five) was not statistically supported.

2. Based upon classification of self knowledge stage there appears to be evidence that sex differences do exist. Females tend to be at the more advanced stage of development than do males. A Chi square value of 10.57 was obtained. This was significant beyond the .01 level with two degrees of freedom.

3. There does not appear to be any evidence to support a relationship between stage of self knowledge and rating effectiveness in the area of knowledge of content material.

4. Based upon classification of self-knowledge stage there appears to be some evidence to support a relationship to planning and dependability. Those student teachers classified at the pattern and process stages of self knowledge tend to be rated at the upper levels of effectiveness in planning and dependability. A Chi square value of 14.73 was obtained. This was significant beyond the .01 level with four degrees of freedom.

5. It appears that those student teachers rated excellent in the area of addressing student interests also tended to be rated in a similar category in the area of communications with others. A Chi square value of 12.01 was obtained. This was significant beyond the .02 level with four degrees of freedom.

6. It appears that those student teachers rated excellent in the area of communications with others also tended to be rated in a similar

category in the area of classroom management skills. A Chi square value of 13.80 was obtained. This was significant beyond the .01 level with four degrees of freedom.

7. It appears that those student teachers rated excellent in the area of addressing student interests also tended to be rated in a similar category in the area of classroom management skills. A Chi square value of 15.18 was obtained. This was significant beyond the .01 level with four degrees of freedom.

Because of the small number composing the sample for this study, it is recommended that a replication of the study be made utilizing a larger population and more refined instrumentation.

Rather than supplying answers regarding the illusive role of self knowledge in teaching effectiveness, these research efforts resulted in the experimenters' ability to question more precisely and profoundly. This ability to astutely question may of itself be a major contribution to the frontier research in humanistic education.

PROBLEM WITH THE SELF KNOWLEDGE MEASURE

A question to be considered in this study addresses the definition of self knowledge and the use of and the coding procedures for the Experience Recall Test.

The University of Massachusetts authors are quick to explain that they do not have a definitive description and measure of self knowledge (Alschuler, et. al., 1977). While making a monumental contribution to the development of the theory of self knowledge, the Experience Recall Test would appear not to be refined enough to supply definitive data for use in a comparative study such as the one just completed at New Mexico State University.

Clients are categorized into one of four discrete stages based upon only one or more tallies at the upper stage, or level. While this, perhaps, may demonstrate ability to function at this level, it fails to

distinguish between individuals within a stage. Can we, in fact, categorize clients at one discrete level? Wouldn't a score on a continuum be of more value for the researcher, and consequently in the final analysis, be more beneficial in working with the client?

THE IDENTIFICATION OF EXCEPTIONAL TEACHERS

Because all student teachers were ranked in the high region of the effectiveness continuum, supervisors' ability to compare and identify the outstanding student teachers was questioned (see Table 5). Instructions to supervisors were to evaluate student teachers in relation to others they had supervised. The ratings were never shared with the student teacher participants because confidentiality in rating was expected to help supervisors feel freer to evaluate objectively. Teacher educators are commonly criticized for grade inflation, and ratings on this Teaching Effectiveness Scale seemed to follow that pattern. A correlation between self knowledge and teaching effectiveness cannot be demonstrated unless participants can be ranked objectively in both effectiveness as a teacher and in level of self knowledge development. The identification of teaching effectiveness seems as illusive as measuring self knowledge.

An understanding of grade inflation or the halo effect in evaluation by supervisors of student teachers (and practicing teachers) seems crucial. Teacher educators may be trying to practice what they preach (i.e., the reinforcement of individual growth) by ranking most student teachers as "very good." Reluctant to compare students, teacher educators may choose rather to reward students for demonstrated growth. Believing that they teach best when they individualize assessment, these professionals may prefer not to consider evaluation or grading as having a role in the credentialing and identification of effective teachers for employment.

On the other hand, teaching effectiveness may not be normative and

any evaluation system which seeks to compare may be in trouble from its conception. Teacher educators may resist "ranking" student teachers because they truly believe that "good teaching" is different for different students, concepts, cultures, environments, and teacher styles. With no objective, agreed upon norms for identification of effective teaching, the reluctance to grade comparatively is understandable. Thus, everyone receives an "A," "B," or "Satisfactory" in student teaching. Most teacher educators would agree that the five areas on the Teacher Effectiveness Scale are important. The first two: 1) knowledge of content, and 2) planning and dependability are less problematic because they are more observable, behavioral, even testable. The inter-personal skill areas: 3) addressing student interests, 4) communication with others, and 5) classroom management skills are generally considered important. However, because most supervisors rely on subjective sense of affective skill, they may be unwilling to trust and adequately defend their intuition. Professionals may be reluctant to make evaluative decisions based on subjective analysis, thus they categorize everyone as "very good" to "excellent" in interpersonal teaching skills. If affective universals for good teaching do exist, they appear to resist measurement (as we now understand it) and educators leave these affective universals to chance in planning teacher education programs.

Perhaps due to the "consumer mentality" affecting many institutions of higher education, there is some pressure to rank seniors as "excellent" in their internships, practica, or student teaching experiences. With the surplus of teachers, only those with exceptional markings get jobs. Student teachers are often unhappy with any grade less than an "A." Until we are more clear about teaching effectiveness and more willing to define and take a stand for quality, it appears as if teacher evaluation is arbitrary and meaningless. It is curious that although students were comparatively evaluated and never informed of the ratings, the majority were rated high. Perhaps the seven teacher educators involved

in the rating sincerely considered the majority of the students as very good or excellent. For whatever reason, these teacher educators were unable or unwilling to distinguish the excellent student teachers from the mediocre ones. Who are the effective teachers? How are they identified?

The move for "accountability" seeks to resolve these issues by measuring effectiveness in terms of achievement test scores. If teaching effectiveness is determined by students' test scores alone, then we must be sure that the tests truly measure what "should" be learned. This method of judging effectiveness must assume the Rousseau view of the child's mind as a tabla raza. Is there agreement that this is indeed an accurate picture of human potential? Criticism of humanistic/affective education as soft and unresearched need not reserve this analysis for humanists alone.

SELF KNOWLEDGE AND PROCESS EDUCATION: EDUCATIONAL VALUES?

If self knowledge is not valued in schools, perhaps it is not an asset in the schools as they presently exist. It is possible that the stage level of self knowledge of the school environment may determine how valuable it is to have teachers who function at higher levels of self knowledge themselves. If system approval is reserved for "situationally" oriented teachers who reduce learning to the acquisition of facts and submission to authority, then individuals who have a "situational" view of themselves and the world may function more satisfactorily there. (Situational teaching: Who discovered America? is an important question because the curriculum guide says it is, and the answer is simplistic and factual at best). Facilitators of process learning may have a difficult time with students who are unaccustomed to creative thinking and with school personnel who disapprove of unorthodox methods and ambiguous answers. The evaluation of effective teaching when left to expert observation may be reduced to the assessment of ability to conform to

the school norm. This pressure to conform may be felt by the college supervisor who must function amicably in the school (no attempt was made in this study to determine the self knowledge stage of the evaluators). When left to achievement testing, the evaluation of effectiveness may be reduced to the ability to teach the tests rather than the students. Process questions (such as "Consider the motives of the Spanish Explorers in the New World. Is there any relationship between what you want from your friends and these motives?") may never be posed in many high school classrooms and are less likely to appear on a standardized achievement test. Self knowledge stage development of teachers may show little correlation to observed and reported teaching effectiveness as long as "situational teaching" is more valued than insight and discovery learning.

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